

WHAT IS CLAIMED IS:

1. An image forming device comprising:
  - a recording section for recording an image on a rewritable image recording medium;
  - a control section for controlling the recording section so that a test image for testing the image recording medium is recorded on the image recording medium;
  - a detection section for detecting the test image recorded on the image recording medium; and
  - a determination section for determining whether the detection section's detection result is within an allowable range or not.
2. The image forming device of claim 1, wherein the control section controls the recording section so that before a predetermined image to be recorded on the image recording medium is recorded on the image recording medium, the test image is recorded on the image recording medium, and when the detection result is outside the allowable range, image recording conditions for recording the predetermined image on the image recording medium are set based on the detection result.
3. The image forming device of claim 2, wherein the control section discharges the image recording medium to a discharging tray for defective media, when the detection result

in the detection section is outside the allowable range even after the image recording conditions have been changed more than once and the test image is recorded and detected.

4. The image forming device of claim 2, wherein the control section controls the recording section so that test images are simultaneously recorded on the image recording medium under a plurality of differing image recording conditions, and sets the image recording conditions, based on each detection result of each test image recorded under each differing image recording condition.

5. The image forming device of claim 2, wherein the predetermined image is recorded on the image recording medium, based on the image recording conditions set by the control section, when the detection result is within the allowable range.

6. The image forming device of claim 1, wherein the control section controls the recording section so that the predetermined image to be recorded on the image recording medium and the test image are simultaneously recorded on the image recording medium, and sets image recording conditions for recording the predetermined image on the image recording medium, based on the detection result when the detection result is outside the allowable range.

7. The image forming device of claim 6, wherein the control section discharges the image recording medium to a

discharging tray for defective media, when the detection result in the detection section is outside the allowable range even after the image recording conditions have been changed more than once and the test image is recorded and detected.

8. The image forming device of claim 6, wherein the control section controls the recording section so that test images are simultaneously recorded on the image recording medium under a plurality of differing image recording conditions, and sets the image recording conditions, based on each detection result of each test image recorded under each differing image recording condition.

9. The image forming device of claim 6, wherein the test image recorded on the image recording medium is deleted when the detection result is within the allowable range.

10. The image forming device of claim 1, wherein the image recording medium is provided with storage medium on which an identification code is stored, the image forming device further comprising:

a read section for reading the identification code stored on the storage medium; and

a history storage section for storing histories of image recording conditions for the predetermined image recorded on the image recording medium, and histories of the detection results, wherein the control section stores the image recording conditions and the detection results in the history storage

section in relation to the identification codes by the control section.

11. The image forming device of claim 10, wherein the control section sets image recording conditions for recording the predetermined image, based on the histories stored in the history storage section.

12. The image forming device of claim 1, wherein the image recording medium is provided with a storage medium onto which the control section stores image recording conditions for the predetermined image recorded on the image recording medium and detection results.

13. The image forming device of claim 12, wherein the control section sets the image recording conditions for recording the predetermined image based on the image recording conditions and the detection results stored in the storage medium.

14. The image forming device of claim 1, wherein the detection section detects display densities of the test image.

15. The image forming device of claim 1, wherein the image recording medium is a rewritable image recording medium onto which an image can be rewritten with an optical signal.

16. An image forming method comprising:

recording a test image for testing a rewritable image recording medium on the rewritable image recording medium based on predetermined image recording conditions;

detecting image-characteristic values of the test image recorded on the image recording medium; and

determining whether the detected image-characteristic values are within an allowable range or not.

17. The image forming method of claim 16, the method further comprising recording a predetermined image on the image recording medium, based on the predetermined image recording conditions, when it is determined that the detection result is within the allowable range.

18. The image forming method of claim 16, further comprising:

changing the predetermined image recording conditions so that the detected image-characteristic values approach the allowable range, when it has been determined that a detection result is outside the allowable range; and

recording the test image on the image recording medium, based on the changed image recording conditions.

19. The image forming method of claim 18, wherein the steps of:

changing the image recording conditions;  
recording the test image on the image recording medium, based on the changed image recording conditions;  
detecting the image-characteristic values; and  
determining are repeated until it is determined that the image-characteristic values are within the allowable range.

20. The image forming method of claim 18, wherein the steps of:

    changing the image recording conditions;  
    recording the test image on the image recording medium, based on the changed image recording conditions;  
    detecting the image-characteristic values; and  
    determining are repeated until a number of repetitions reaches a predetermined number.

21. The image forming method of claim 16, the method further comprising storing at least one of image recording conditions for at least one image recorded on the image recording medium, and the detected image-characteristic values, wherein the predetermined image recording conditions are defined based on at least one of the stored image recording conditions and the image-characteristic values.